

Amendments to the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

1.-27. (Cancelled)

28. (Currently Amended) A sensor comprising:

a sensor body having a space for receiving an active protein in a solidified form; and

an active protein disposed within the space of the sensor body, the active protein comprising glucose oxidase, human serum albumin, and a cross-linking reagent, wherein the active protein has a solidified form prior to being disposed within the space of the sensor body and is received within the space of the sensor body while in solidified form.

29. (Cancelled)

30. (Original) A sensor according to claim 28, wherein the cross-linking reagent is selected from a group consisting of glutaraldehyde, disuccinimidyl suberate (DSS), and 1-Ethyl-3 (3-Dimethylaminopropyl) Carbodiimide (EDC).

31. (Cancelled)

32. (Currently Amended) A sensor according to claim 28, wherein the active protein is has been exposed to a ~~non-liquid~~ vapor phase cross-linking process.

33. (Currently Amended) A sensor according to claim 32, wherein the active protein is has been incubated prior to ~~exposing the protein mixture~~ having been exposed to the ~~non-liquid~~ vapor phase cross-linking process.

34. (Currently Amended) A sensor according to claim 32, wherein the active protein is has been immersed in a cross-linking solution after ~~exposing the protein solution~~ having been exposed to the ~~non-liquid~~ vapor phase cross-linking process.

35. (Currently Amended) A sensor according to claim 28, wherein the active protein is has been exposed to a vapor phase that is approximately 12.5% (w/w) glutaraldehyde for approximately 16 hours.

36. (Currently Amended) A sensor according to claim 32, wherein the active protein is has been incubated by ~~maintaining~~ having maintained the protein mixture at approximately room temperature for at least approximately two hours prior to exposing the protein mixture to the ~~non-liquid~~ vapor phase cross-linking process.

37. (Currently Amended) A sensor according to claim 32, wherein the active protein is has been immersed in a cross-linking solution by ~~submerging~~ having submerged the protein mixture in a buffered solution that is approximately 2.5% (w/w) glutaraldehyde for approximately one hour after ~~exposing~~ having exposed the protein solution to the ~~non-liquid~~ vapor phase cross-linking process.

38. (Previously Presented) A sensor according to claim 28, wherein the cross-linking reagent is glutaraldehyde.

39. (Previously Presented) A sensor according to claim 32, wherein the cross-linking reagent is glutaraldehyde.

40. (Previously Presented) A sensor according to claim ~~28~~ 32, wherein the cross-linking reagent is selected from a group consisting of glutaraldehyde, disuccinimidyl suberate (DSS), and 1-Ethyl-3 (3-Dimethylaminopropyl) Carbodiimide (EDC).

41. (Previously Presented) A sensor according to claim 28, wherein the glucose oxidase has a concentration that is between approximately 67,000 U/ml and 150,000 U/ml.

42. (Previously Presented) A sensor according to claim 41, wherein the human serum albumin has a concentration that is between approximately 23% (w/v) and 32.5% (w/v) of the active protein.

43. (Previously Presented) A sensor according to claim 28, wherein the human serum albumin has a concentration that is between approximately 23% (w/v) and 32.5% (w/v) of the active protein.

44. (Previously Presented) A sensor according to claim 28, wherein the active protein further comprises silicone.

~~49.~~ 45. (Currently Amended) A sensor according to claim 44, wherein silicon particles are included in the active protein, and the volume of the silicone particles is less than 20% of the volume of the active protein.

~~50.~~ 46. (Currently Amended) A ~~hardened~~ solidified protein material for a sensor comprising:

a protein ~~mixture~~ component comprising at least one protein, the protein component being combined with a cross-linking reagent;

wherein the combined protein ~~mixture~~ component and cross-linking reagent is ~~hardened~~ solidified into at least one pellet for disposing in a sensor.

~~51.~~ 47. (Currently Amended) A ~~hardened~~ solidified protein material according to claim ~~50~~ 46, wherein the protein ~~mixture~~ component combined with a crosslinking reagent comprises a protein mixture that had been exposed to a ~~non-liquid~~ vapor phase cross-linking process.

~~52.~~ 48. (Currently Amended) A ~~hardened~~ solidified protein material according to claim ~~51~~ 47, wherein the protein ~~mixture~~ component comprises a protein ~~mixture~~ component which is had been incubated prior to ~~exposing~~ the protein ~~mixture~~ component having been exposed to the ~~non-liquid~~ vapor phase cross-linking process.

~~53.~~ 49. (Currently Amended) A ~~hardened~~ solidified protein material according to claim ~~51~~ 47, wherein the protein ~~mixture~~ component comprises a protein ~~mixture~~ component which is had been immersed in a cross-linking solution after ~~exposing~~ the protein ~~solution~~ component had been exposed to the ~~non-liquid~~ vapor phase cross-linking process.

54. 50. (Currently Amended) A ~~hardened~~ solidified protein material according to claim 50 46, wherein the protein ~~mixture component~~ comprises a protein ~~mixture component~~ which is has been exposed to a vapor phase that is approximately 12.5% (w/w) glutaraldehyde for approximately 16 hours.

55. 51. (Currently Amended) A ~~hardened~~ solidified protein material according to claim 51 47, wherein the protein ~~mixture component~~ comprises a protein ~~mixture component~~ which is had been incubated by maintaining the protein ~~mixture component~~ at approximately room temperature for approximately two hours prior to ~~exposing~~ the protein ~~mixture component~~ having been exposed to the ~~non-liquid~~ vapor phase cross-linking process.

56. 52. (Currently Amended) A ~~hardened~~ solidified protein material according to claim 51 47, wherein the protein ~~mixture component~~ comprises a protein ~~mixture component~~ which is had been immersed in a cross-linking solution by submerging the protein mixture in a buffered solution that is approximately 2.5% (w/w) glutaraldehyde for approximately one hour after ~~exposing~~ the protein solution had been exposed to the ~~non-liquid~~ vapor phase cross-linking process.

57. 53. (Currently Amended) A ~~hardened~~ solidified protein material according to claim 50 46, wherein the protein ~~mixture component~~ comprises glucose oxidase and human serum albumin.

58. 54. (Currently Amended) A ~~hardened~~ solidified protein material according to claim 50 46, wherein the cross-linking reagent is glutaraldehyde.

59. 55. (Currently Amended) A ~~hardened~~ solidified protein material according to claim 57 53, wherein the cross-linking reagent is glutaraldehyde.

60. 56. (Currently Amended) A ~~hardened~~ solidified protein material according to claim 50 46, wherein the cross-linking reagent is selected from a group consisting of glutaraldehyde, disuccinimidyl suberate (DSS), and 1-Ethyl-3 (3-Dimethylaminopropyl) Carbodiimide (EDC).

~~61.~~ 57. (Currently Amended) A ~~hardened~~ solidified protein material according to claim ~~57~~ 53, wherein the glucose oxidase has a concentration that is between approximately 67,000 U/ml and 150,000 U/ml.

~~62.~~ 58. (Currently Amended) A ~~hardened~~ solidified protein material according to claim ~~61~~ 57, wherein the human serum albumin has a concentration that is between approximately 23% (w/v) and 32.5% (w/v) of the combined protein component and cross-linking agent.

~~63.~~ 59. (Currently Amended) A ~~hardened~~ solidified protein material according to claim ~~50~~ 46, wherein the human serum albumin has a concentration that is between approximately 23% (w/v) and 32.5% (w/v) of the combined protein component and cross-linking agent.

~~64.~~ 60. (Currently Amended) A ~~hardened~~ solidified protein material according to claim ~~50~~ 46, wherein the at least one pellet is configured as at least one elongated ~~rope-like~~ structure having a dimension that is elongated relative to its other dimensions.

~~65.~~ 61. (Currently Amended) A solidified protein material according to claim 46, wherein the at least one pellet comprises ~~an elongated rope-like structure~~ a plurality of pellets that had been cut into pieces from a single continuous length of protein material.

~~66.~~ 62. (Currently Amended) A ~~hardened~~ solidified protein material according to claim ~~64~~ 60, wherein each elongated ~~rope-like~~ structure is semi-cylindrical in cross-section.

~~67.~~ 63. (Currently Amended) A ~~hardened~~ solidified protein material according to claim ~~50~~ 46, wherein the protein ~~mixture~~ component comprises a protein ~~mixture~~ component in which silicone has been added.

~~68.~~ 64. (Currently Amended) A ~~hardened~~ solidified protein material according to claim ~~50~~ 46, wherein silicon particles are included in the protein component, the volume of the silicone particles is less than 20% of the volume of the protein ~~mixture~~ component.

~~69.~~ 65. (Currently Amended) An active protein for disposing in a sensor, the active protein comprising a solidified pellet composed of glucose oxidase, human serum albumin, and a cross-linking reagent.

~~70.~~ 66. (Currently Amended) An active protein as recited in claim ~~69~~ 65, wherein the active protein is ~~hardened~~ solidified into at least one pellet before disposing in the sensor.

67. (New) A sensor as recited in claim 28, wherein the solidified form of the active protein comprises a pellet that is hard enough to maintain its shape without external forces.

68. (New) A solidified protein material as recited in claim 46, wherein the solidified pellet is hard enough to maintain its shape without external forces.

69. (New) An active protein as recited in claim 65, wherein the solidified pellet is hard enough to maintain its shape without external forces.